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PPLICATION NO.	F	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/639,301		08/14/2000	Susan M. Janz	10002711-1	9455
22879	7590	10/09/2003		EXAMINER	
		ARD COMPANY	MOORE, JAMES K		
P O BOX 272400, 3404 E. HARMONY ROAD INTELLECTUAL PROPERTY ADMINISTRATION FORT COLLINS, CO 80527-2400				ART UNIT	PAPER NUMBER
				2686	THE EXPLOSIBLE
TORTODE	, DII 10, OC	00327 2400		DATE MAILED: 10/00/2003	フ

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)					
Office Action Summers	09/639,301	JANZ, SUSAN M.					
Office Action Summary	Examiner	Art Unit					
TI MANINO DATE CHI	James K Moore	2686					
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply							
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, - Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). Status	36(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).					
1) Responsive to communication(s) filed on	·						
2a) This action is FINAL . 2b)⊠ Thi	s action is non-final.						
3) Since this application is in condition for allowa							
closed in accordance with the practice under a Disposition of Claims	Ex parte Quayle, 1935 C.D. 11, 4	53 O.G. 213.					
4) Claim(s) 1-20 is/are pending in the application.							
4a) Of the above claim(s) is/are withdrawn from consideration.							
5) Claim(s) is/are allowed.							
6)⊠ Claim(s) <u>1,3,4,6-12,14 and 16-20</u> is/are rejected.							
7)⊠ Claim(s) <u>2,5,13 and 15</u> is/are objected to.							
8) Claim(s) are subject to restriction and/or election requirement.							
Application Papers							
9) The specification is objected to by the Examiner.							
10)⊠ The drawing(s) filed on <u>14 August 2000</u> is/are: a)⊠ accepted or b)⊡ objected to by the Examiner.							
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). 11) The proposed drawing correction filed on is: a) approved b) disapproved by the Examiner.							
If approved, corrected drawings are required in reply to this Office action.							
12) The oath or declaration is objected to by the Examiner.							
Priority under 35 U.S.C. §§ 119 and 120							
13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).							
a) ☐ All b) ☐ Some * c) ☐ None of:							
1. Certified copies of the priority documents	s have been received.						
2. Certified copies of the priority documents		on No					
3. Copies of the certified copies of the prior application from the International Bur	ity documents have been receive eau (PCT Rule 17.2(a)).	d in this National Stage					
* See the attached detailed Office action for a list of the certified copies not received. 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).							
a) ☐ The translation of the foreign language provisional application has been received.							
15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.							
Attachment(s)							
 Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO-1449) Paper No(s) 	5) Notice of Informal F	(PTO-413) Paper No(s) Patent Application (PTO-152)					

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DETAILED ACTION

Response to Arguments

- 1. Applicant's request for reconsideration of the finality of the rejection of the last Office action is persuasive and, therefore, the finality of that action is withdrawn.
- 2. Applicant's arguments, see page 7, lines 20-24, filed September 8, 2003, with respect to the rejection(s)of claim(s) 1-20 under 35 U.S.C. 102(b) have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of the combination of Joao (U.S. Patent No. 5,917,405), Ausems et al. (U.S. Patent No. 6,434,403), and Schofield (U.S. Patent No. 5,877,897).

Claim Rejections - 35 USC § 103

- 3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 4. Claims 1, 4, 9, 12, and 17-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Joao in view of Ausems et al. and Schofield et al.

Regarding claim 1, Joao discloses a system comprising a personal communication device (3), such as a mobile telephone, for a wireless system. See col.

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19, lines 51-60 and col. 20, lines 7-42. The personal communication device includes an output port, and provides data to the output port indicating a predetermined event has occurred in response to occurrence of the predetermined event. See col. 20, lines 44-49. The system also comprises actuator circuitry (in apparatus 1) which has an input coupled to the device's output port, and an output, and which provides a signal in response to the data being applied to the input. See col. 20, line 56 through col. 21, line 2, and col. 22, lines 25-32. The actuator circuitry includes a conductor which is coupled between a vehicle's horn, and the output of the actuator circuitry. See col. 22, lines 34-48. The actuator circuitry effects honking of the horn in response to the data being provided to the input of the actuator circuitry. See col. 34, line 61 through col. 35, line 8.

Joao does not disclose that the personal communication device (3) is a personal digital assistant including a memory defining a database, a microprocessor coupled to the memory, and input/output device coupled to the microprocessor, a wireless modem coupled to the microprocessor, and an output port coupled to the microprocessor.

Ausems discloses a personal digital assistant (100) including a memory defining a database (address book 270), a microprocessor (305) coupled to the memory, an input/output device (display 145) coupled to the microprocessor, a wireless modem (220) coupled to the microprocessor, and an output port (125) coupled to the microprocessor. The output port provides a digital output. See Figure 2; col. 3, lines 5-21; col. 3, lines 36-49; col. 3, lines 58-64; col. 5, lines 48-54; col. 6, lines 8-18; col. 6, lines 60-66; and col. 7, lines 53-62. Ausems teaches that the personal digital assistant provides more functions, such as full address book and scheduling functions, than a

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conventional mobile telephone. See col.1, lines 12-65. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify Joao with Ausems, such that the personal communication device is a personal digital assistant, in order to provide more functions.

The combination of Joao in view of Ausems does not teach that the actuator circuitry's output is analog, or that the actuator circuitry includes a digital to analog converter which provides the analog output in response to the digital input from the personal digital assistant. Schofield discloses a vehicle intrusion detection system that actuates a vehicle horn in response to receiving control input signals. Schofield teaches that a vehicle horn is actuated by analog signals (80). The system's actuator circuitry requires a digital to analog converter (52) to convert digital control signals generated by a CPU (logic circuit) to analog signals in order to actuate the horn. See Figure 6A and col. 20, lines 27-45. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the combination of Joao and Ausems with Schofield, such that the actuator circuitry's output is analog and the actuator circuitry includes a digital to analog converter which provides the analog output in response to the digital input from the personal digital assistant, in order to actuate the vehicle's horn.

Regarding claims 4 and 12, Joao in view of Ausems and Schofield teaches all of the limitations of claims 1 and 9, and Joao also teaches that the honking of the horn may be a pattern of discrete spaced apart honks. See col. 35, lines 6-8.

Regarding claims 9 and 17, Joao discloses a personal communication devicevehicle interface system, for use with a personal communication device (3), such as a

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mobile telephone, for a wireless system. See col. 19, lines 51-60 and col. 20, lines 7-42. The personal communication device includes an output port, and provides data to the output port indicating a predetermined event has occurred in response to occurrence of the predetermined event. See col. 20, lines 44-49. The interface system also comprises actuator circuitry (in apparatus 1) which has an input coupled to the device's output port, and an output, and which provides a signal in response to the data being applied to the input. See col. 20, line 56 through col. 21, line 2, and col. 22, lines 25-32. The output of the actuator circuitry is coupled to an electrically actuated vehicle component (e.g., a horn) that, when actuated, is audible, and the actuator circuitry effects actuation of the vehicle component in response to the data being provided to the input of the actuator circuitry. See col. 22, lines 34-48 and col. 34, line 61 through col. 35, line 8.

Joao does not disclose that the personal communication device (3) is a personal digital assistant including a memory defining a database, a microprocessor coupled to the memory, and input/output device coupled to the microprocessor, a wireless modem coupled to the microprocessor, and an output port coupled to the microprocessor.

Ausems discloses a personal digital assistant (100) including a memory defining a database (address book 270), a microprocessor (305) coupled to the memory, an input/output device (display 145) coupled to the microprocessor, a wireless modem (220) coupled to the microprocessor, and an output port (125) coupled to the microprocessor. The output port provides a digital output. See Figure 2; col. 3, lines 5-21; col. 3, lines 36-49; col. 3, lines 58-64; col. 5, lines 48-54; col. 6, lines 8-18; col. 6,



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lines 60-66; and col. 7, lines 53-62. Ausems teaches that the personal digital assistant provides more functions, such as full address book and scheduling functions, than a conventional mobile telephone. See col.1, lines 12-65. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify Joao with Ausems, such that the personal communication device is a personal digital assistant, in order to provide more functions.

The combination of Joao in view of Ausems does not teach that the actuator circuitry's output is analog, or that the actuator circuitry includes a digital to analog converter which provides the analog output in response to the digital input from the personal digital assistant. Schofield discloses a vehicle intrusion detection system that actuates a vehicle horn in response to receiving control input signals. Schofield teaches that a vehicle horn is actuated by analog signals (80). The system's actuator circuitry requires a digital to analog converter (52) to convert digital control signals generated by a CPU (logic circuit) to analog signals in order to actuate the horn. See Figure 6A and col. 20, lines 27-45. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the combination of Joao and Ausems with Schofield, such that the actuator circuitry's output is analog and the actuator circuitry includes a digital to analog converter which provides the analog output in response to the digital input from the personal digital assistant, in order to actuate the vehicle's horn.

Regarding claim 18, Joao in view of Ausems and Schofield teaches all of the limitations of claim 17, and Joao also discloses that the vehicle component may be a horn. See col. 34, line 61 through col. 35, line 8.

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Regarding claim 19, Joao in view of Ausems and Schofield teaches all of the limitations of claim 17, and Joao also discloses that the vehicle component may be a light. See col. 35, lines 9-12.

5. Claims 3, 6, 7, 10, 11, 14, and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Joao in view of Ausems et al. and Schofield et al. as applied to claims 1 and 9 above, and further in view of well known prior art.

Regarding claims 3, 10, 11, and 20, Joao in view of Ausems and Schofield teaches all of the limitations of claims 1, 9, and 17, but does not teach that the system includes a battery charger having a power input plug connector configured to be coupled to a vehicle cigarette lighter power port and having an output connector, or that the personal digital assistant includes a rechargeable battery and has a connector port configured to be coupled to the output connector of the battery charger. However, the examiner takes Official Notice of the fact that it is well known in the art to include a rechargeable battery in a PDA, in order to avoid having to frequently replace batteries. It is also well known in the art to provide a battery charger to the PDA which couples a connector port of the PDA to a vehicle cigarette lighter power port, in order to allow the PDA's battery to recharge while it is being transported in a vehicle. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention, to further modify the combination of Joao, Ausems, and Schofield, such that the system includes a battery charger having a power input plug connector configured to be coupled to a vehicle cigarette lighter power port and having an output connector, and

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that the personal digital assistant includes a rechargeable battery and has a connector port configured to be coupled to the output connector of the battery charger, in order to avoid having to frequently replace batteries and to allow the PDA's battery to recharge while it is being transported in a vehicle.

Regarding claims 6, 10, and 11, Joao in view of Ausems, Schofield, and well known prior art teaches all of the limitations of claims 3 and 9, and Joao also discloses that the actuator circuitry is powered by the vehicle, which would result in it being coupled to the power input plug connector. See col. 35, line 59 through col. 36, line 25.

Regarding claims 7, 10, 11, and 14, Joao in view of Ausems, Schofield, and well known prior art teaches all of the limitations of claims 3 and 9, and it is also inherent that a battery charger includes charger circuitry. Furthermore, the system resulting from the combination of references also comprises a common housing (the vehicle housing) which supports the digital to analog circuitry and the charger circuitry.

6. Claims 8 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Joao in view of Ausems et al. and Schofield et al. as applied to claims 1 and 11 above, and further in view of Pan (U.S. Patent No. 6,304,764).

Regarding claims 8 and 16, Joao in view of Ausems and Schofield teaches all of the limitations of claims 1 and 11. Ausems also discloses that the personal digital assistant includes mobile phone circuitry (210). See Figure 2. It is inherent that the mobile phone circuitry includes ringer circuitry that provides a signal to actuate ringing when a phone call initiation attempt is received, since a user must be notified when an

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incoming call is received. The combination of Joao, Ausems, and Schofield does not teach that the PDA provides data to the output port indicating that a phone call initiation attempt is being received, in response to the ringer circuitry indicating that a phone call initiation attempt is being received.

Pan discloses a hands-free kit for a mobile phone for use in a vehicle. The mobile phone provides data to an output port that indicates that a phone call initiation attempt is being received, in response to ringer circuitry in the phone indicating that a phone call initiation is being received. The output port provides the data to the vehicle's speakers to allow the mobile phone to ring through the speakers, in order to allow a user to hear the ring more clearly. See Figure 3a and col. 5, lines 11-47. It would have been obvious to one of ordinary skill in the art at the time of the invention to further modify the combination of Joao, Ausems, and Schofield with Pan, such that the PDA provides data via the output port to speakers in the vehicle indicating that a phone call initiation attempt is being received, in response to the ringer circuitry indicating that a phone call initiation attempt is being received, in order to allow the user to hear a ring more clearly.

Allowable Subject Matter

7. Claims 2, 5, 13, and 15 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

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Conclusion

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ken Moore, whose telephone number is (703) 308-6042. The examiner can normally be reached on Monday-Friday from 8:30 AM - 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marsha Banks-Harold, can be reached at (703) 305-4379.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

or faxed to:

(703) 872-9314 (for Technology Center 2600 only)

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth Floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

Ken Moore

JRM

10/3/03

Mouston O Bamb Harold

MARSHA D. BANKS-HAROLD SUPERVISORY PATENT EXAMINER **TECHNOLOGY CENTER 2600**

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